

AMENDMENTS TO THE CLAIMS

This listing of claims replaces all prior versions, and listings, of claims in the application:

Listing of Claims:

1-16. (Cancelled).

17. (Currently Amended) In a system for receiving digital programming content comprised of multiple channels, and wherein the programming content of each channel is provided in an encoded digital format determined by the provider of the content, an apparatus for recording one or more selected channels without decoding them prior to recording so as to store them in the same encoded digital format as determined by the content provider in order not to degrade the recording quality of the selected channels, the apparatus comprising:

an entertainment system for receiving, isolating and storing a first channel of digital programming content while decoding and displaying a second channel of digital programming content, the entertainment system comprising:

a display device for displaying programming content of a selected channel; and

a set top box configured to receive a multiplexed signal containing multiple channels of digital programming content, where in the digital programming content of each channel received at the set top box is encoded in a digital format that is determined by a content provider, the set top box being further configured to isolate a first channel of digital programming content and display the first channel or a second channel on the display device, the set top box including:

a single tuner and a demodulator adapted for receiving and operating on a multiplexed signal containing the digital programming content to identify multiple channels within the multiplexed signal and which contain the digital programming content, wherein the demodulator is connected to the tuner so as to receive a tuned signal directly therefrom, the demodulator further being adapted to produce a multiplexed transport stream comprising audio, video and data packets associated with a plurality of channels;

a transport demultiplexer coupled to the ~~output of the demodulator~~ and adapted to receive the multiplexed transport stream directly from the demodulator and to demultiplex the plurality of channels of the transport stream in order to permit

selection of the first channel, the transport demultiplexer being capable of selecting a channel encoded in a plurality of digital formats;

a storage device coupled to the transport demultiplexer for recording the first channel without decoding it so as to store ~~it~~ the first channel as it was received at the set top box, such that the digital format in which the digital content of the first channel is stored may be determined from the content provider, the storage device storing the first channel using the same digital format with which the at least one channel was received at the set top box and as provided by the content provider, and in order to store the digital content of the at least one channel without degrading it, wherein the storage device can receive content encoded in any of the plurality of digital formats from the transport demultiplexer; ~~and~~

a decoder connected to the storage device for decoding digital programming content of the second channel and coupled to the transport demultiplexer, wherein the digital programming content of the second channel was stored on the storage device prior to decoding, and the decoder is adapted to decode the digital programming content of the second channel into an analog format at the same time that the storage device records the first channel; and

means for enabling a user to select to record the digital content of the first channel while watching the decoded digital programming content of the second channel.

18. (Cancelled).

19. (Cancelled)

20. (Currently Amended) An apparatus as defined in ~~claim 19~~ claim 17, wherein the decoder is ~~also~~ coupled to the transport demultiplexer so that a selected first channel output from the transport demultiplexer may be simultaneously directed to both the storage device for recording and to the decoder for display of the selected channel as it is recorded.

21. (Previously Presented). An apparatus as defined in claim 17, further comprising a conditional access system for determining whether a selected channel may be displayed.

22. (New) In a set-top box for receiving digital programming content comprised of multiple channels, and wherein the programming content of each channel is provided to the set top box in an encoded digital format determined by the provider of the content, a system for recording one or more selected channels without decoding them prior to recording so as to store them in the same encoded format as determined by the content provider in order not to degrade the recording quality of the selected channels, and thereby also permitting display of one of the recorded channels while recording another one of the selected channels, the system comprising:

- a single tuner for tuning a multiplexed signal received at the set top box to a particular transponder of a content provider's content delivery system;

- a demodulator coupled to the single tuner to receive the tuned multiplexed signal directly from the tuner, the demodulator being adapted to demodulate the tuned signal and output a multiplexed transport stream containing at least one channel of audio and video data;

- a transport demultiplexer coupled to the demodulator so as to receive the multiplexed transport stream directly from the demodulator, the transport demultiplexer being adapted to demultiplex the transport stream and isolate a particular channel of video and audio data;

- a storage medium coupled to the transport demultiplexer to receive and store the particular channel of video and audio data directly from the transport demultiplexer in an encoded format that is the same as an encoded format in which the particular channel is received by the tuner; and

- a decoder coupled to the transport demultiplexer and to the storage medium, wherein the decoder is adapted to:

- when encoded data of the particular channel is being stored in the storage medium, access previously stored encoded data from the storage medium and decode the previously stored encoded data into a displayable format; and

- when encoded data of the particular channel is not being stored in the storage medium, receive the particular channel of video and audio data directly from the transport demultiplexer, and decode the particular channel of video and audio data as it is received into the displayable format.

23. (New) A system as recited in claim 22, wherein the particular channel of video and audio data isolated by the transport demultiplexer has a digital format.

24. (New) A system as recited in claim 22, wherein the displayable format is analog.
25. (New) A system as recited in claim 22, wherein the isolated particular channel is compressed.

26. (New) In a set-top box for receiving digital programming content comprised of multiple channels, and wherein the programming content of each channel is provided to the set top box in an encoded digital format determined by the provider of the content, a system for recording one or more selected channels without decoding them prior to recording so as to store them in the same encoded format as determined by the content provider in order not to degrade the recording quality of the selected channels, and thereby also permitting display of one of the recorded channels while recording another one of the selected channels, the system consisting of:

- a single tuner for tuning a multiplexed signal received at the set top box to a particular transponder of a content provider's content delivery system;

- a demodulator coupled to the single tuner to receive the tuned multiplexed signal directly from the tuner, the demodulator being adapted to demodulate the tuned signal and output a multiplexed transport stream containing at least one channel of audio and video data;

- a transport demultiplexer coupled to the demodulator so as to receive the multiplexed transport stream directly from the demodulator, the transport demultiplexer being adapted to demultiplex the transport stream and isolate a particular channel of video and audio data;

- a storage medium coupled to the transport demultiplexer to receive and store the particular channel of video and audio data from the transport demultiplexer in an encoded format that is the same as an encoded format in which the particular channel is received by the tuner;

- a decoder coupled to the transport demultiplexer and to the storage medium, wherein the decoder is adapted to:

- when encoded data of the particular channel is being stored in the storage medium, access previously stored encoded data from the storage medium and decode the previously stored encoded data into a displayable format; and

- when encoded data of the particular channel is not being stored in the storage medium, receive the particular channel of video and audio data directly from the transport demultiplexer, and decode the particular channel of video and audio data as it is received into the displayable format; and

- means for enabling a user to selectively record the encoded data the particular channel while simultaneously decoding the previously stored encoded data for display to the user.